



U.S. ENVIRONMENTAL PROTECTION AGENCY, REGION 2

April 29, 2019

BY ELECTRONIC MAIL

Robert Law, Ph.D.
de maximis, inc.
186 Center Street, Suite 290
Clinton, New Jersey 08809

Re: Draft 2012 Benthic Invertebrate Community Reference Data Report for the Lower Passaic River Study Area, dated August 26, 2013

Dear Dr. Law:

The U.S. Environmental Protection Agency (EPA) has reviewed the revised draft of *Draft 2012 Benthic Invertebrate Community Reference Data Report* for the Lower Passaic River Study Area, dated August 26, 2013, prepared by Windward Environmental LLC on behalf of the Cooperating Parties Group (CPG).

EPA provided comments on September 21, 2018 and the CPG submitted responses to the comments on October 18, 2018. EPA reviewed these responses to comments and the revised report and determined that all comments were addressed with the exception of comment 1. EPA conditionally approves the report as long as comment 1 is addressed. Please finalize the report in accordance with Section X, Paragraph 44(a) of the Agreement. If there are any questions or clarifications needed, please contact me to discuss.

Sincerely,

A handwritten signature in dark ink, appearing to read "Diane Salkie".

Diane Salkie, Remedial Project Manager
Lower Passaic River Study Area RI/FS

Cc: Zizila, F. (EPA)
Sivak, M. (EPA)
Hyatt, B. (CPG)
Otto, W. (CPG)

Comment No.	Section	EPA Comment 9/25/2018	Response 10/18/2018	EPA Response
1	General Comment	<p>Throughout the document, there appears to be confusion between the definition of background and reference locations since each term is interchanged with one another and in some instances, are both used in the same sentence (e.g., first sentence of second paragraph of Section 1.1). It is the impression of the reviewer that the purpose of this investigation was to characterize benthic communities representative of background conditions, not reference. It is recommended that any mention of reference be revised to read background. This includes the title of the report and Figure 2-1.</p> <p>If both terms are used, the document should clearly define/distinguish what is to be considered background and reference locations. EPA recommends referring the background to local background or similar, the locations should be similar to site conditions, without site-specific chemical releases. A true reference location should be characterized as having no potentially hazardous chemical releases, site-related or not. In other words, as pristine as possible, which based on past discussion with CPG may be difficult given the study area.</p>	<p>The terms background and reference are used to represent different things in the report. The second paragraph of Section 1.1 presents the purpose of the 2012 sediment collection program, which included the collection of sediment chemistry data for the characterization of background (i.e., upstream concentrations that could contribute to concentrations in the LPRSA). SQT data were collected upstream of Dundee Dam to represent freshwater reference conditions. As stated in the USEPA-approved Benthic QAPP Addendum No. 5 (final 10-26-2012), the SQT data from 24 locations upstream of Dundee Dam will provide a dataset to establish reference conditions for comparison to data collected in the LPRSA.</p> <p>No changes have been made to the text in the report.</p>	<p>It appears that the terms "background" and "reference" are used almost interchangeably. A close review of the document seems to indicate that the reference conditions were found in the background locations.</p> <p>The BERA lists two types of background: "background", defined as upstream of Dundee Dam; and "regional background", which includes Jamaica Bay and Mullica River/Great Bay SQT data, surface water, sediment, and tissue. However, there is no definition of "reference".</p> <p>For clarity, a definition for each term needs to be clearly presented in the report. Also, please confirm that these terms are used consistently throughout the report.</p>